



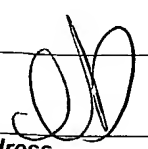
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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/650,291	08/28/2003	James H. Keithly	0876-0086.01	6680
26568	7590	08/24/2004	EXAMINER	
COOK, ALEX, MCFARRON, MANZO, CUMMINGS & MEHLER LTD SUITE 2850 200 WEST ADAMS STREET CHICAGO, IL 60606			PRATT, HELEN F	
			ART UNIT	PAPER NUMBER
			1761	

DATE MAILED: 08/24/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/650,291	Applicant(s) KEITHLY ET AL.	
	Examiner Helen F. Pratt	Art Unit 1761	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 August 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-30 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-30 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION***Double Patenting***

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1-30 are rejected under the judicially created doctrine of double patenting over claims 1-47 of U. S. Patent No. 6,143,347 since the claims, if allowed, would improperly extend the "right to exclude" already granted in the patent.

The subject matter claimed in the instant application is fully disclosed in the patent and is covered by the patent since the patent and the application are claiming common subject matter, as follows: the claims of the patent encompass the application because they are to processes and products using various orange cultivars in the same manner, and claiming inherent characteristics of those oranges.

MISCELLANEOUS

It is noted that this application is also a continuation of US application 09/583334, filed May 31, 200, now abandoned. This information should be added to applicant's "cross reference to related application" section on page 1.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bonaventura et al. or Gmitter (Citrus Processing Short Course 1995) in view of Moore (0288 103), "Citrus Industry" (Castle), June 99, Castle Declaration, Tresser, Lafuente et al. (XP-000937579) and Pao et al. and further in view of Atkins et al. (3,917,867) and Chenchin et al. (6,007,863) and Horticultural Field Day, St. Cloud, Florida (Castle) and Gmitter (Citrus Processing Short course 1995) and Food Industry Short Course 1992, Lee and Castle (J. Agric. Food Chem., pages 877-882) and Pio et al.

Bonaventura et al. disclose a product containing orange juice made by combining juices made from early, middle or late season fruit. Various sensory characteristics were evaluated depending on the fruit blend and sources used (abstract). Gmitter discloses that it is known to test orange cultivars to meet the demand for quality processed citrus products and that improvements are dictated as to the cultivar profile and that two factors, juice quality and maturity season are major forces in breeding. Also, trees are planted which yield early and mid-season orange cultivars and late season oranges and that there is a need to blend high with low-colored juice to make non-from concentrate juice (pages 165 and 166). The reference discloses that there is

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an effort to produce early maturing fruit with good juice quality and color and that more than 40 cultivars have been evaluated (page 167, first paragraph). Claim 1 differs from the references in the use of particular cultivars and in using oranges from various seasons in which the fruit have peak properties with particular Brix acid ratios compared to other harvesting times. In particular, in using the mid-season cultivars, Vernia and Frost to blend with juices with early-to mid season round orange fruit or with late season round orange fruit, harvested after the mid-season peak period. However, it is seen that it is known to blend juices from the various parts of the growing season as shown by Bonaventura and Gmitter. Certainly, it would have been within the skill of the ordinary worker to choose a particular cultivar, which exhibits various characteristics such as sweetness and brix and acidity to blend with other juices since this is the object of the above research and is also disclosed by these additional references. Moore discloses that it is known to mix two naturally occurring orange juices, typically early season and late-season respectively for the function of achieving particular desirable Brix/acid ratios (abstract and page 2, lines 24-60).

Castle '99 (Citrus Industry) discloses that the Hamlin orange is the standard for comparison for juice quality factors including color, yield and time of maturity (page 25, middle column). The reference also discloses that it would be helpful to have cultivars that mature ahead of the Hamlin orange with a 36 color score in Nov. or an orange that had good color in February and brix ratio (page 24, 1st col.). In fact, Castle '99 (Citrus Industry) discloses the claimed Vernia cultivar and states that it has an earlier maturity than Hughes with excellent color (Table 6) and color. As to the Vernia SC it "is clearly

a selection that matures early in the Valencia season and can reach 13 ratio in February" (page 28, 1st and 2nd columns). This statement meets the claimed requirements of maturity of the Vernia orange as to peak properties as the claimed cultivar has been shown which would inherently have the claimed properties. The above reference is to basically a description of new cultivars. The Declaration of William S. Castle shows the connection between the cultivars of this article and orange juice beverages. The Declaration states on page 2, paragraph 3, that one of the purposes of locating citrus cultivars was to identify early maturing cultivars whose juice color and other chemical properties would make them suitable for early season harvesting and for use in various processed orange juice products. The Declaration stated that the practice of mixing juices had been discussed previously to achieve, among other benefits, improved color.

Tresser gives a clear definition of the various seasons for oranges to mature (page 40, last paragraph and page 42, full page, page 64, first full paragraph).

Lafuente et al. '579 discloses that it is known to blend orange juice to make a pre-established color with late varieties such as Valencia (abstract and page 4).

Food Industry Short Course 1992 discloses that it is known to use mid-season oranges for blending because they consistently produce sufficient juice color from season to season (page 4, 1st para.) The reference discloses that choosing a root stock will not turn Hamlin juice into Valencia juice, but it is a decision that determines fruit yield and juice soluble solids/acid ratio are important to fruit maturity and harvesting schedules. Also, it is known to choose use oranges which have particular juice ratios,

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particularly at least 13. The term "root stock" is considered to be another way of saying 'cultivar' (page 6, last two paragraphs).

Lee and Castle disclose that it is known to improve juice from a cultivar with a high juice content such as Hamlin, with juices of higher color and quality (page 877 and abstract) and that many orange cultivars are evaluated with this in mind. In fact one selection (Earlygold) which matured earlier than the Hamlin orange had satisfactory color.

Pio et al. disclose that various cultivars have been tested for industrial juice (page 2, and page 12, Table 5).

Pao disclose that the flavor quality of early season Hamlin oranges and grapefruit juices could be improved by blending with juices of many available variations (abstract).

Atkins et al. disclose that it is known to blend early and mid-season cultivars with the Valencia orange juice (abstract and col. 9, lines 22-35).

Chenchen et al. disclose that it is known to blend juices from various seasons to achieve a particular Brix acid ratio (abstract and col. 6, lines 20-64, col. 10, lines 15-30).

Castle discloses that it is known to test various cultivars to determine various characteristics such as soluble solids, (page 7), color and flavor (page 9 and 12). The Declaration of William Castle states that one of the purposes of the early Florida citrus grower Orie Lee and himself was to locate and identify early-maturing cultivars whose juice color and other chemical properties would make them suitable for early season harvesting and use in orange juice products (page 2, para. 3). Therefore, it would have

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been obvious to test juices from various cultivars to determine various characteristics important to an acceptable juice and to blend juices from particular cultivars to make a product with particular sensory characteristics. It would have been obvious to use particular cultivars such as Vernia as disclosed by Castle 99 because the Castle Declaration says that one of the purposes of locating citrus cultivars was to identify early maturing cultivars with suitable juice color and other chemical properties and that these juices were mixed with other juices to achieve among other benefits, improved color. It would also have been obvious to mix juices of the claimed cultivar Vernia with the juices of early or late season cultivars because Bonaventura et al. disclosed orange juices made from mixing early, middle and late season oranges and Gmitter discloses that research was being done to find oranges with the required characteristics, the juice of which would have good quality and color. Other references such as Moore, Laflente, Short Course, Lee and Castle, Pao, Atkins, Chechin et al., Castle, Gmitter disclose that it is known to mix juices from various seasons together to achieve a desirable Brix/acid ratio or other characteristics, and it would have been obvious to use the teachings of Tresser who disclose as background that oranges from 3 seasons are known and that Pio discloses that testing of oranges to determine particular characteristics is known. Therefore, it would have been obvious to mix juices from various seasons as claimed to produce an orange juice composition with a greater BAR value and sensory qualities superior than the original orange juice.

Claims 2-4 further require that the harvesting occur at particular seasons.

However, the reference to Bonaventura et al. disclose that it is known to use fruits from

early, middle and late seasons and to blend the juices together. Certainly, if one can harvest at particular time in one season, then one could harvest at other times of the year, knowing the particular characteristics of the juices. The further use of sensory scores from various cultivars is also seen as within the skill of the ordinary worker as in claim 6, and particular sources having green characters of a particular amount as in claim 7, bitterness as in claim 8 and sensory feeling as in claim 9, sourness as in claim 10, and other characteristics as in claim 11. The whole process of blending requires that various characteristics of the oranges are taken into consideration. The same is true for claims 12-20, 22. Therefore, it would have been within the skill of the ordinary worker to use various characteristics of the oranges produced at the same time for their known functions in blending of juices.

The particular amounts of juice are seen as within the skill of the ordinary worker as the reference because juice products with such are well known as in claim 5. Therefore, it would have been obvious to use various amounts of juices to make a particular composition.

The limitations of claims 23-25, 27 have been discussed above and are obvious for those reasons.

Claims 16, 21 and 26 further requires a particular color number. However, this is a well known color number cited as preferable by Castle, Citrus Industry, and that it would have been helpful to have cultivars that mature ahead of the Hamlin orange with a 36 color score in Nov. Bonaventura et al. disclose that it is known to use mid season fruit and to blend it with other juices from the two other growing seasons (page 284, 3rd

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col. 1st complete para.). Therefore, it would have been obvious to blend juices from the various seasons and to use a particular color score to make the required product.


Claims 28-30 require particular characteristics of the juice and juices in particular amounts produced at various times. However, it is seen that as the characteristics of the juices are well known and can be determined by various tests, it would have been obvious to use juices with particular characteristics and in various amounts and to use particular cultivars for their known function of making particular juices.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Helen F. Pratt whose telephone number is 571-272-1404. The examiner can normally be reached on Monday to Friday from 9:30 to 6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Milton Cano, can be reached on 571-272-1398. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

WSP
8-19-04


HELEN PRATT
PRIMARY EXAMINER